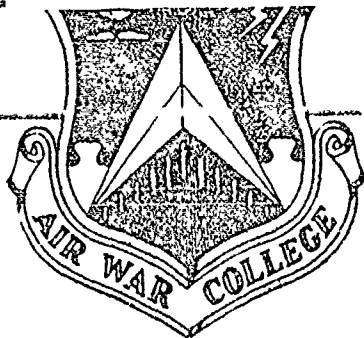


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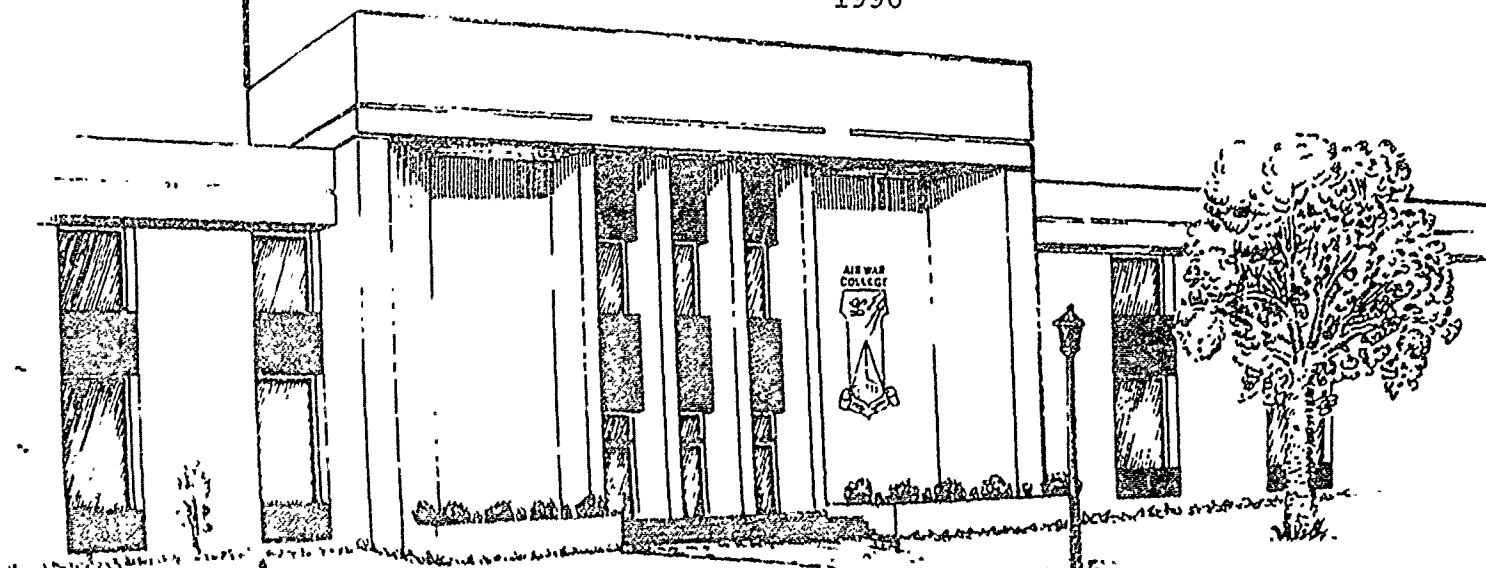
PROPOSAL FOR A COMPREHENSIVE, INTEGRATED
NATIONAL WARNING SYSTEM

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UNITED STATES AIR FORCE
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PROPOSAL FOR A COMPREHENSIVE, INTEGRATED
NATIONAL WARNING SYSTEM

by

Kenneth D. Rowley
Defense Intelligence Agency

A DEFENSE ANALYTICAL STUDY SUBMITTED TO THE FACULTY
IN
FULFILLMENT OF THE CURRICULUM
REQUIREMENT

Advisor: Mr Bruce Morland

MAXWELL AIR FORCE BASE, ALABAMA

May 1990

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EXECUTIVE SUMMARY

TITLE: Proposal for a Comprehensive, Integrated National Warning System AUTHOR: Kenneth D. Rowley, Defense Intelligence Agency

The current National Warning System has neither the organization nor the analytical cohesion to perform effectively the vital function of providing timely and accurate strategic warning to the NCA. In order to correct this critical deficiency, the Intelligence Community must make three basic changes. First, the Community should create a National Warning Center under the direction of the National Intelligence Officer for Warning. The Center should be manned by experienced senior warning analysts from the three national agencies: the CIA, the DIA, and the NSA. Second, the Community should adopt and expand a standard warning analytical methodology based on the DOD warning system. Third, the Community should establish a training program and communications procedures which will integrate all intelligence analysts into the strategic warning process.

BIOGRAPHICAL SKETCH

Mr Kenneth D. Rowley (M.A., Georgetown University) has been directly involved in the strategic warning process since 1984, while serving in various capacities ranging from Soviet/Warsaw Pact Desk Officer to Division Chief in the Alert Center of DIA's National Military Intelligence Center. He served as an Armored Cavalry officer in the U.S. Army from 1966 to 1973, including three years in South Vietnam. While in Vietnam, Mr Rowley was awarded three Bronze Stars, the Purple Heart, and the Combat Infantryman's Badge, among other awards. He was medically retired in 1973 as the result of wounds received during the 1972 Easter Offensive. Mr Rowley is a graduate of the Air War College, class of 1990.

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CHAPTER I

INTRODUCTION

Historically, the most important mission of a country's intelligence community is to provide the national leadership with timely, accurate warning of an impending attack by a hostile force. The importance of warning intelligence to the United States is clearly stated in our National Security Strategy. "Early warning of developments which could place at risk U.S. interests is vital if we are to employ the relevant elements of national power in a timely way and deal with threats before they become unmanageable, or entail the risk of conflict." (1:23) Clearly, the National Command Authorities (NCA) want something more than simple intelligence reporting. Although the United States has not been directly attacked since Pearl Harbor, our present warning apparatus does not provide the responsive strategic warning necessary to the NCA.

The world has grown smaller, and bilateral and multi-lateral treaties and agreements have grown more complex. The need for warning has extended to include direct and indirect threats to both formal and informal allies. Today, threats are as likely to emanate from a terrorist group as from a national government. The United States is faced with monitoring and responding to developments throughout the world

wherever our interests are threatened. At the same time, budgetary constraints and changing East-West relations are resulting in increasing reductions in U.S. combat forces. As these tensions are reduced, our future involvements are less likely to relate to Soviet/Warsaw Pact activities and more likely to occur in the Third World. In some cases, the use of U.S. military forces may be necessary, as in Grenada and Panama. Timely and accurate strategic warning can provide the NCA with the intelligence assessments necessary for effective deployment and employment of our smaller military forces to safeguard U.S. interests around the world. Ideally, the Intelligence Community would be able to provide sufficient lead time in its warning assessments to allow the NCA to exercise options other than just military. With adequate prior warning of hostile intent, the NCA might dissuade an adversary by using overt or covert political, economic, social, or other nonmilitary means. Unfortunately, the current U.S. National Warning System fails both organizationally and substantially to provide the NCA with this type of warning. Several factors contribute to the inadequacy of the current system. Although there is a rudimentary National Warning System and Staff under the Director of Central Intelligence (DCI), it has little support or impact within the primary national level agencies--the Central Intelligence Agency (CIA), the Defense Intelligence Agency (DIA), or the National Security Agency (NSA). Where these agencies do focus on warning, the efforts

are essentially unilateral with little coordination or uniformity of effort. Where methodologies have been developed to assess warning, they have been hampered by institutional limitations and lack of interagency cooperation. Finally, there is a widespread ignorance of the value and fundamentals of warning intelligence throughout the Community. This ignorance results in a consequent misunderstanding of both the uses and importance of this critical intelligence function.

Any effort to improve the state of warning within the U.S. Intelligence Community must begin with a basic understanding of the various types of warning intelligence. This basic understanding will be followed by an examination of the strengths and weaknesses inherent in any warning system. Then, with an understanding of the importance of warning intelligence, a proposed restructuring of the U.S. warning system will be presented. This will include a new organizational structure, an expanded warning methodology, and a formula for integrating both the organization and the method throughout the existing national intelligence network.

CHAPTER II

UNDERSTANDING WARNING

The most common misconception regarding warning intelligence is that it is merely a branch of one of the more recognized types of intelligence--current intelligence, basic (research) intelligence, or estimative intelligence. Most frequently, it is linked to current intelligence. In reality, warning intelligence draws its information from all these areas. What makes warning intelligence a separate, high-risk, analytical discipline is its focus on intentions as well as capabilities and the refining of both into a series of warning indicators which can judge the threat in a time context.

An enemy's capabilities and intentions to wage war are the keys to predicting future behavior. Estimates of military capabilities are generally based on hard evidence. However, intentions are more fluid and ambiguous. (2:56) There is also a dialectic connection between intentions and capabilities. Intentions will drive the building of capabilities and limitations on capabilities impose constraints on intentions. (2:57-58)

It is the goal of the warning analyst to assess both capability and intent prior to the beginning of hostilities. The ambiguity of enemy intent is usually the factor which

increases the risk of warning. This may be due to deception by the enemy or the absence of a final decision. As the scope of the proposed combat actions increases, so does the amount of preparatory time required. This action, in turn, increases the likelihood that intention will actually be a series of phased decisions based on current and projected capabilities and the environment. It is here where early strategic warning can provide a deterrent and why high-risk early warning is the most beneficial. As an enemy escalates his capabilities, he may not foresee his future moves. However, even if his ultimate goal is clear, events may cause him to rethink that goal. That is, an unforeseen change in environment, whether external or internal, can change his plans. (3:54-56) Effective early strategic warning can provide an opportunity to change that environment.

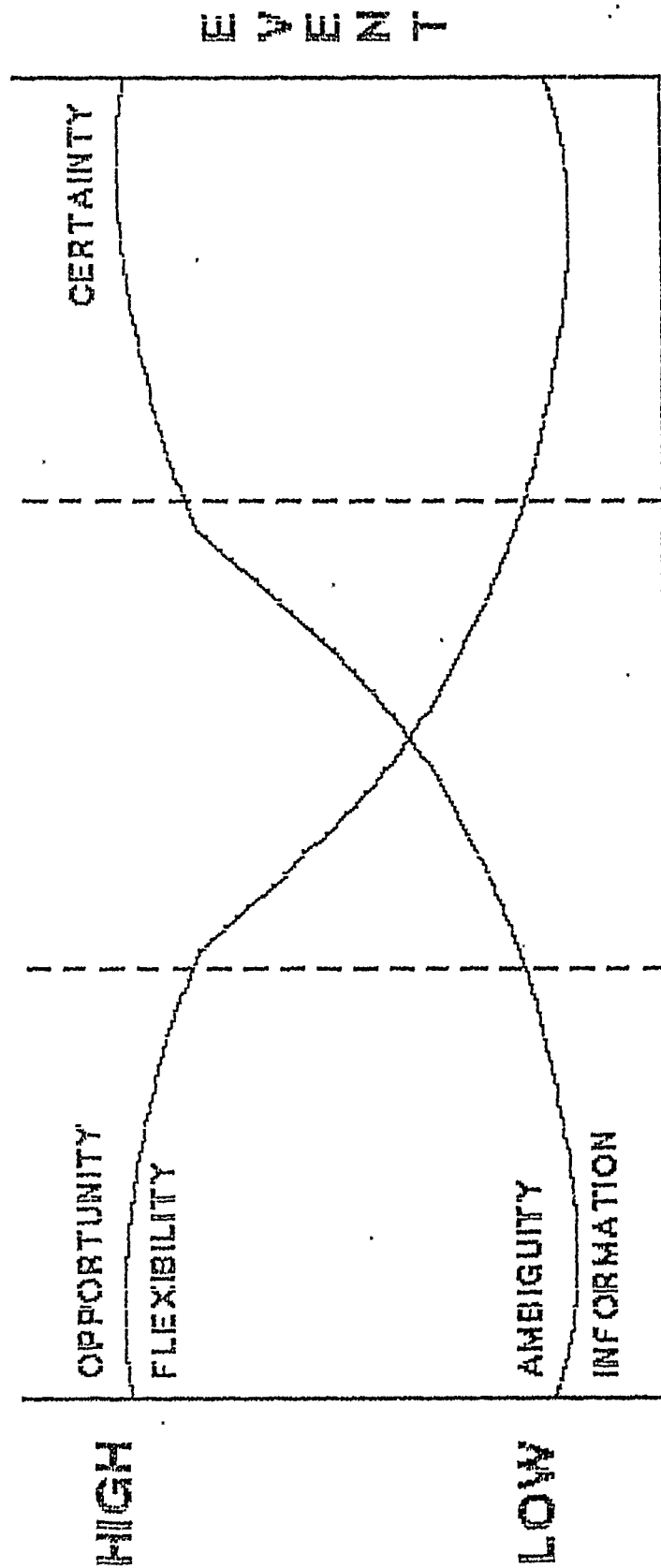
Both the value and risk of strategic warning is demonstrated in Figure 1. As time progresses toward the hostile event, the information, and hence the degree of certainty, increases. Unfortunately, as intelligence certainty increases, the options and flexibility for the decision maker is reduced. (4:5) The mission of the warning analyst is to gather enough certainty in an ambiguous environment to provide multiple options.

Types of Warning

Warning is a much misunderstood and misused term. The Defense Department defines strategic warning as "a notification

OPTIONS

POLITICAL ECONOMIC MILITARY



TIME

TIME/OPTIONS GRAPH

Figure 1

that enemy-initiated hostilities may be imminent" and also as "a warning prior to the initiation of a threatening act." (5:350) A more comprehensive definition of strategic warning is "the message sent by the Intelligence Community to the decision makers, . . . warning that war or hostile military action is a possibility." (2:22) This last definition designates the responsibility for warning with the Intelligence Community and the prime recipient as the decision makers. It also suggests the inherent ambiguity of strategic warning. Implicit in that ambiguity is the time factor. As warning is given earlier, it will tend to be more ambiguous. However, warning that is received when hostilities are imminent reduces options almost exclusively to the military. A system which focuses almost solely on military capabilities and actions, as the current DOD system does, will usually provide limited strategic warning lead time and, thus, limited options. These limitations result in what can be called "crisis management" warning. The goal of every strategic warning analyst should be stretching the lead time and avoiding a crisis management situation.

Another aspect of strategic warning, and the one most often associated with that term, is warning of a missile attack. While "strategic" in nature, and certainly a "warning," it can be more appropriately designated "tactical-technical warning." The nature of the attack and the required speed and nature of the response literally makes this

a "tactical" situation, albeit on a global scale. In addition, the source of the warning is primarily mechanical based on our National Technical Means (NTM). This type of warning is beyond the scope of the strategic warning analyst, although one can hope for an earlier warning than missile launch.

Also within the scope of strategic warning is a critical service performed by the strategic warning analyst which can be called "predictive warning." During peacetime, military forces assess their readiness through exercises. Each exercise is based on an imagined scenario which creates an artificial environment and threat. Every effort is made to make these scenarios reflect the "real world" as much as possible to provide the best measure of combat readiness. Similar scenarios are frequently used to project force requirements under certain threat conditions. Additionally, warning analysis of the scenario events will provide an estimate of the amount of warning lead time available before simulated hostilities begin. The obvious implications for force structure requirements has made "predictive warning" an integral part of the DOD budget process. In the mid-1980s, the DIA warning system was successfully used against a North Korean attack scenario. More recently and significantly, it was also used against the Illustrative Planning Scenario of the Defense Guidance (now the Defense Planning Guidance). In both cases, "predictive warning" analysis resulted in changes in the scenarios which increased their validity, and subsequent

refinement of the projected warning times. This form of strategic warning can assist in the planning and budget cycle, but its accuracy in estimating warning time is limited by the accuracy of the basic scenario. Recent indirect attacks on this process fail to recognize the dependence and vulnerability of static scenarios, and dependent warning estimates, on rapid changes in the real threat environment. (6:18, 7:1) Once the environment has stabilized and a new scenario is developed, "predictive warning" can again provide a refined warning time estimate.

The focus of this paper is on the essence of strategic warning, that is, early and accurate warning assessments provided to the NCA which allow sufficient lead time to permit multiple response options. The keys to this strategic warning are lead time and appropriate warning indicators.

The Time Factor in Warning

The vital link connecting intelligence assessment and effective countermeasures is advance warning, and the key to advance warning is time. Analysts are more willing to give strategic warning based on enemy capabilities, that is, the forces and means sufficient for launching an attack. However, this usually provides little lead time prior to attack. A more high-risk strategic warning is based on a combined assessment of the enemy's capabilities and intentions. The best estimates will be made earlier, with more ambiguous information, before the enemy is fully prepared militarily. Many analysts are

reluctant to provide true early warning because of the higher risk of error and retribution. (2:22)

There are other factors besides ambiguity which can cause erroneous estimates of warning time. If the victim believes that the military balance is in his favor and the opponent needs additional preparations, he may overestimate the amount of warning time available. This was the case in the 1973 Yom Kippur War. Israeli intelligence concluded that the Egyptians and Syrians were unprepared. At the same time, our State Department indicated that the climate in the Middle East and world in general argued against a major Arab attack. (8:48, 9:131-134) In another notable failure, a U.S. intelligence estimate on October 28, 1950 stated that the Chinese would not intervene in Korea. In this case, the belief was that the opponent would use means other than military, such as political pressure, etc., before resorting to military action as a last resort. (10:111) Misperceptions can also lead countries to view the possibility of war in terms of months or years. This mistake can result in a low level of preparedness which actually invites attack. Similar misperception and consequent low preparedness was another factor leading to the Yom Kippur War. (2:15)

The best way to avoid these analytical pitfalls is through the use of warning indicators which force the analyst to look past preconceptions and see reality. These incident- or event-oriented statements can also help reduce ambiguity in

the warning analysis. However, since most warning indicators tend to reflect the enemy's preparations for war, they usually do not appear until shortly before hostilities begin. That means additional time for warning must come from expanding indicators to reflect political, economic, and social change or events. (2:30)

Importance of Warning Indicators

There are several factors which handicap the strategic warning analyst. The increasing amount of information generated by intelligence collection creates significant problems for analysis. Analysts can't contend with or absorb the large volume of information and this can affect their estimates. (11:385) Well defined and validated warning indicators, which serve to focus an analyst's efforts, can separate a significant "signal" from the background "noise" of irrelevant or inconsistent signals obscuring important information. (12:691)

Most events are potentially foreseeable and avoidable. They don't happen overnight. During the "incubation period" prior to a hostile incident, a series of events will occur which are outside established norms. Without warning indicators to highlight these events, they may be "unnoticed, misperceived, or ignored because of erroneous assumptions, information-handling difficulties, lack of standards, . . . and reluctance to fear the worst." (2:9) While there is no way to eliminate misperception in a complex world filled with

ambiguous information, warning indicators provide a good screening process and reality check. (13:184)

Warning indicators are generally produced by preparations for war. However, this tendency should not limit these indicators to military actions or events. Preparations for hostilities, especially on a large scale, will include political and economic events and changes which may precede military activity by several weeks or months. These early activities can be a main source of early indicators. (2:43) Therefore, it is sensible and prudent to extend warning indicators into areas other than military in order to extend warning lead time. Of course, these indicators tend to be more ambiguous because they also tend to be less necessary to the campaign than certain military activity. But, even with their ambiguity, these early indicators can focus the warning analyst's attention (and the entire Intelligence Community) on a developing situation and consequently lead to early strategic warning.

CHAPTER III

THE U.S. NATIONAL WARNING COMMUNITY

The present national warning community is composed primarily of two independent warning systems. The National Intelligence Warning System was established by Director of Central Intelligence Directive 6/1 (DCID 6/1) dated 13 October 1982. This directive requires the Intelligence Community as a whole to support the Director of Central Intelligence in his responsibility for warning the President and the National Security Council of threats to U.S. security interests by hostile, foreign actions or events. Warning functions are required in the watch centers at the Central Intelligence Agency, the Department of State, the National Sigint Operations Center (NSOC) of the National Security Agency, the National Photographic Interpretation Center (NPIC), the Defense Intelligence Agency, and the military services. In reality, the majority of warning analysis is conducted within the National Warning Staff and in the Alert Center of DIA's National Military Intelligence Center (NMIC). Although the bulk of the National Warning Staff is physically located within the NMIC, there is little or no communication or coordination between these two bodies because each has separate reporting channels.

The National Warning Staff

The Director of Central Intelligence has charged the National Intelligence Council (NIC) with the responsibility for advice and assistance in matters pertaining to strategic warning. This responsibility is an additional duty for the regional and functional area National Intelligence Officers (NIOs). However, strategic warning is the primary responsibility of the NIO for Warning (NIO/W). To assist him as the principal national warning officer for the Intelligence Community the NIO/W has a staff of approximately ten comprised of a mixture of senior civilian analysts from CIA, DIA, and NSA, and representatives from the four services. With few exceptions, these personnel are on rotational assignments and have little or no practical experience with warning intelligence. With this minimal support, the NIO/W and his staff still conduct briefings, produce periodic Warning Reports, and host routine and ad hoc Warning meetings. Given the importance placed on warning intelligence by the President, it would seem that this is somewhat less than a minimal effort in this critical special field. In fact, the National Warning Staff could serve as a nucleus for a new expanded approach to the whole concept of strategic warning.

The Department of Defense Indications and Warning System

The Department of Defense Indications and Warning System (DODIWS) was established by Executive Order 12333 dated 4 December 1981 to coordinate, organize, and systemize the

process of warning throughout the DOD intelligence community, especially within the Defense Intelligence Agency (DIA) and the Unified and Specified Commands and major subordinate commands. It consists of a confederation of intelligence staffs charged with providing warning intelligence to their commanders, and the I&W system members in general, concerning potential threats to U.S. interests within their commander's area of responsibility. (14:2) This mission requires personnel capable of performing warning analysis and a facility capable of rapidly processing and disseminating that analysis. DIA is responsible for establishing operational policy and procedures for the I&W system, for training personnel for system members, and for monitoring compliance. This responsibility places the Director, DIA, in the position of responsibility for the System with little direct authority over its members. This collegial situation obviously generates problems of its own, but these problems are manageable when compared with the larger problems confronting the overall National Warning System.

The Worldwide Warning Indicator Monitoring System

The key element which makes the DOD I&W System function is the Worldwide Warning Indicator Monitoring System (WWIMS). The concept for the WWIMS, indicator-based, matrix system was initially developed by the U.S. European Command (EUCOM) in the early 1980s. The use of indicators has long been recognized as critical to the monitoring of developing situations which could pose a threat to national interests. Confronted with massive

amounts of information concerning Soviet and Warsaw Pact activities, EUCOM sought a method to see through the "noise" and focus on those significant discrete events indicating anomalous activity which could be indicative of an increasing threat. Such an event could be the deployment of strategic aviation assets to a forward staging base or the movement of major ground force units from their garrisons. The next step toward WWIMS required a historical assessment of each indicator to determine the normal range of activity. For example, the deployment of a large number of submarines may be unusual, but it may coincide with an established pattern of periodic exercise activity and therefore be considered "normal" in that time frame. In this way, each event can be isolated and assessed on its own merits. EUCOM's major contribution was in developing a manner in which these discrete events could be overlaid and interrelated to provide an overview of the total situation. Hence, a matrix was developed which included categories of forces, and functions which might occur within those forces. Ultimately, this was further developed by DIA into the WWIMS Indicator Matrix shown in Figure 2. This matrix allowed the blending of widespread events and incidents into an overall picture of total activity. For example, using this system it became easier to determine whether troop, aircraft, or ship movements constituted a potential threat or whether they are part of an isolated or regional training activity. In much the same way, activity within certain indicators directed

WWIMS INDICATOR MATRIX

	10	20	30	40	50	60	70	80	90
	GROUND FORCES	NAVAL FORCES	AIR FORCES	AEROSPACE DEFENSE FORCES	STRATEGIC STRIKE FORCES	NATIONAL COMMAND AUTHORITIES	INTERNAL AFFAIRS	EXTERNAL AFFAIRS	SPACE
1	COMMAND AND CONTROL/POLITICAL								
2	COMMUNICATIONS								
3	LOGISTICS/ECONOMIC								
4	INTELLIGENCE/SECURITY								
5	FORCE OPERATIONS/POPULATION								
6	CHEMICAL BIOLOGICAL RADIOLOGICAL								
7	MOBILIZATION AND READINESS								

Figure 2

the analyst to other areas of the matrix and a search for information on other forces or functions which could clarify the purpose of the activity. Thus, the use of the matrix system guides the analyst to related events and even to additional collection requirements.

DIA has expanded the use of the WWIMS matrix and indicator data base beyond the European Theater. There are now a series of Warning Problems, reflecting NCA concern, ranging from monitoring Warsaw Pact activity, to the North/South Korea confrontation, the strategic threat to the United States, and the Arab/Israeli conflict. (14:9) In addition to these and other major Warning Problems, others are established on a formal ad hoc basis as problems develop elsewhere in the world.

Unfortunately, there are several inherent problems with the WWIMS. It was originally developed to focus on the potential threat of conventional war in the European Theater between the Warsaw Pact and NATO. Therefore, the indicator data base was necessarily oriented toward major conventional warfare. It is much less applicable to conflicts involving Third World states, insurgencies, and terrorist activities. Political, social, and economic activity can be just as significant in indicating potential threats under these conditions. Although the importance of these nonmilitary areas is recognized in the WWIMS concept, the overwhelming focus of existing indicators is on military activity. (14:5) Since WWIMS indicators have been developed within DOD primarily by

military intelligence analysts for the purpose of providing warning to their commanders, this military orientation should not come as a surprise. However, it is widely recognized that even in a conventional war scenario there are many political, social, and economic events which, if identified, could provide early indications of hostile intentions. These early indicators are precisely those which can result in an early warning assessment to the NCA, thus affording a broader range of options or courses of action in defusing a developing situation. DIA has attempted to expand the existing indicator data base, especially in the low intensity conflict arena, by developing new, more appropriate indicators. However, this process has been limited by a shortage of both assets and expertise.

Even with its limitations, the WWIMS concept provides a frame work which has served the DOD I&W community fairly successfully for over a decade. Although DIA has made efforts to improve and expand the utility of the basic system across a broader spectrum of potential conflicts, the most critical limitation is its isolated use only within the DOD component of the national intelligence community.

CHAPTER IV

A NEW NATIONAL WARNING SYSTEM

Any improvement in the existing National Warning System must begin with recognition at the highest levels within the Intelligence Community of significant weaknesses in our current warning apparatus. The leadership of the Community must understand and appreciate the importance and special nature of warning analysis as a critical service to the NCA. Beyond mere recognition, there must be a commitment of manpower, time, and training directed at improving the existing system. This chapter contains several proposals with this in mind.

The first and most imposing hurdle in improving strategic warning is overcoming a negative attitude based on ignorance and misunderstanding of the fundamentals of warning intelligence. This attitude, which permeates the Intelligence Community, is the result of lack of exposure to, and training in, warning intelligence; and this lack of understanding handicaps attempts to improve the existing warning system. Part of this problem is systemic. The normal development pattern for new analysts does not include exposure to warning intelligence as a separate discipline. A new analyst is usually focused on a specific function or region, such as Soviet wheat production or French missile developments. As the

analyst publishes articles in his area, the accuracy and quality of his analysis leads to advancement and the area of coverage will normally broaden, for example, to Soviet agriculture and economics or the European aerospace industries. There may be no occasion in an entire career for an analyst to come in contact with a warning analyst. And yet, input from research and current intelligence analysts is critical to accurate and timely warning analysis. Perhaps the most important contribution of this proposal is to institutionalize between analysts at all levels and the warning system with the National Warning Center at the core.

The National Warning Center

There is no better time to restructure the National Warning System than the present. Events in Eastern Europe and the Soviet Union will inevitably lead to reductions in U.S. military forces. An argument can be made that fewer combat forces increase the need for rapid, accurate intelligence, particularly warning intelligence which impacts troop deployments and crisis management. Therefore, it seems reasonable that the intelligence agencies should be augmented or, at least, maintained at current levels. In reality, it is quite likely that these agencies also will experience reorganization and reductions. As painful as this process may be, it affords the Intelligence Community the opportunity to create a new integrated National Warning Center to serve as the focus for U.S. warning intelligence.

Using the current National Warning Staff as a nucleus, the National Warning Center (NWC) should be created and placed directly under the DCI or, for administration only, under the Intelligence Community Staff (IC Staff). Direction would come, as it currently does for the Warning Staff, from the National Intelligence Officer for Warning. He would be assisted by newly created senior warning officers at both DIA and NSA. In addition to overseeing the operation of the NWC, these three senior intelligence officers would ensure effective communication of warning information among agencies and between agencies and the NWC. They would also monitor the effectiveness of agency training programs to ensure a basic understanding of warning intelligence is attained and maintained within the Community.

The National Warning Center should be composed of approximately 30 personnel. Two-thirds would be senior analysts (GG-14 and above) with prior experience in strategic warning in their parent agencies. The remaining 10 would be administrative/technical support staff. A proposed organizational diagram and a manning table are enclosed as Figures 3 and 4. Manning could be accomplished through a combination of detail and rotational assignments shared among the three national agencies.

There may be a requirement for a small night watch for emergencies, but this is not meant to compete with or duplicate the various existing Watch and Alert Centers. The NWC's

NATIONAL WARNING CENTER ORGANIZATION CHART

NIO FOR WARNING

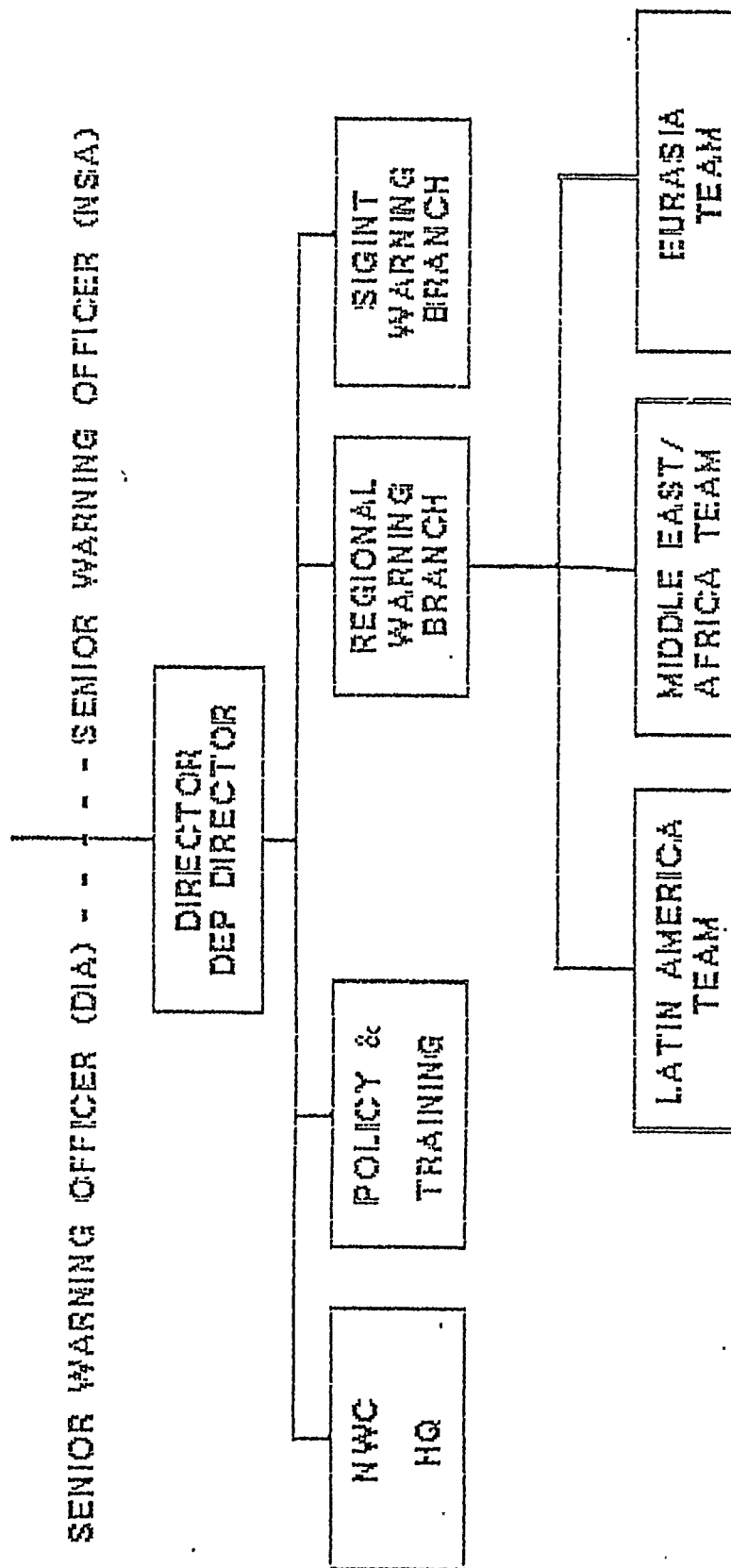


Figure 3

NATIONAL WARNING CENTER

MANNING TABLE

Director SES
Deputy Director GG-15/O-6

NWC Headquarters

Admin Officer GG-13
Senior Secretary GG-11
Secretary GG-7/9

Regional Warning Branch

Chief GG-15
Secretary GG-7/9

Policy & Training Team

Chief GG-14/15
Analysts (2) GG-13/14
Secretary GG-5/7

Latin America Team

Analysts (3) GG-14/15
Intel Tech GG-7/9

SIGINT Warning Branch

Chief GG-15
Analysts (3) GG-14/15
Intel Tech GG-7/9
Secretary GG-5/7

Middle East/Africa Team

Analysts (3) GG-14/15
Intel Tech GG-7/9

Eurasia Team

Analysts (4) GG-14/15
Intel Tech GG-7/9

Figure 4

primary focus will be on medium and long-term warning analysis. Thus, the NWC becomes the Intelligence Community's source for strategic warning analysis and forecasting in support of the DCI, and, ultimately, the NCA. Crisis management will remain with the agency and service watch teams. Although the NWC analysts may make analytical contributions during a crisis, their major contribution to the watch centers and their parent agencies will be the development and maintenance of a standard analytical methodology based on DIA's WWIMS with an expanded indicator data base and a refined matrix system. In addition, the NWC will develop mechanisms to provide their assessments, and other analytical input, throughout the Community to maintain maximum interagency communications.

Expanding the WWIM System

The DIA WWIM System has proven itself as a viable system for warning indications, but it has also demonstrated significant flaws which were mentioned in Chapter III. The first major task of the NWC would be to ensure full Community cooperation in expansion of the present indicator base. CIA, DIA, and NSA must cooperate jointly to validate and refine existing indicators and create new indicators where needed. Areas of known deficiencies are politics, economics, social, and cultural behavior, and communications/signal activity. Expansion of indicators into nonmilitary areas should allow warning analysts to provide warning significantly earlier than with the current system. It will also make the new system more

responsive and applicable to situations in the Third World, insurgencies, and possibly even terrorist activities. During this development process, it may also be possible to determine a weight factor for certain indicators within specific Warning Problems. As part of this expansion process, the analysts of the National Warning Center would lead and coordinate the Community process of tailoring the matrix (Figure 2) to fit each Warning Problem. This could result in the deletion of Strategic Forces and Space categories in some cases and the addition of categories such as Irregular/Militia Forces in others. The end result would be a more flexible and dynamic methodology applicable to almost any developing situation. Of course, since nothing remains constant, the NWC would supervise an annual Community review and update of the indicator base.

Automation would be key to interagency communication and management of this national warning methodology. Computers would be used to assist in, but not replace, the human analytical process. Automation will also make this system more time sensitive and less manpower intensive. Some initial steps in this direction have been taken by DIA with the basic WWIMS. This early work can become a starting point for an interagency warning network with the NWC at its hub. As with all aspects of this new National Warning System, from creation, to manning, to data base expansion, the automation effort must be a Community program so all members can effectively participate in the warning process.

Total Community Participation

Without the backing of the Intelligence Community leadership and the senior personnel within the various agencies, any attempt at rejuvenating the National Warning System is futile. The first step must be education. DIA and CIA currently conduct classes on warning, but they are limited in both size and scope. With the advent of the joint methodology of an expanded WWIMS, Community courses could provide practical application as well as warning theory. The Watch/Alert Centers in each agency would be the organizational focus of warning analysis, but every analyst would be a knowledgeable part of the system. For example, an analyst examining the missile production in country Y would have a list of appropriate indicators relating to missile activity extracted from the Warning Problem associated with country Y. In this way, the analyst most expert in a specific area will be monitoring anomalous activity, be best able to judge its significance, and have a reporting channel within his organization and also to the NWC. This same analyst will be involved in the annual review of indicators for currency, and at any time can recommend new indicators, changes in normalcy, additional related indicators, and changes in collection guidance and requirements.

Under the new Warning System, every analyst is an integral part of the process. It would be impossible for the senior analysts in the National Warning Center to be

substantive experts in every aspect of a geographic region or functional area. It would also be impossible for these analysts to screen every piece of classified and unclassified information received by the Intelligence Community. However, if every intelligence analyst is aware of the indicators in their area, they can report unusual activity directly to the senior warning analysts at the National Warning Center. In addition, the Watch/Alert Center analysts who deal with more current, time-sensitive information can also pass data directly to the NWC. Communication will be the key to the success of a new National Warning System. The proposed system would ensure horizontal flow among the agencies and the NWC, as well as vertical flow from NWC analysts to analysts throughout the Community. At the National Warning Center, analysts would evaluate inputs from analysts and watch centers and provide feedback by disseminating updated Warning Problem matrices accompanied by a narrative. This will effectively complete the information loop and keep the individual analyst aware of the overall status of a specific Warning Problem.

Problems Inherent in a New System

Other than the normal bureaucratic inertia each new idea faces, the most pressing problem in establishing a new National Warning System is lack of acceptance. To some, the National Warning Center may be perceived as a costly additional layer of bureaucracy of questionable use being proposed at the very time we are being asked to tighten our collective

intelligence belts. However, rather than merely empire building, the new warning system would only take billets released from the participating agencies through reorganization, and should be viewed as an opportunity to improve Intelligence Community capabilities. A relatively small investment in both manpower and money would create a small Center and develop a methodology through which the Intelligence Community could focus its efforts, substantially upgrading our warning capability and, more importantly, our ability to provide the NCA with more time and options during crisis.

Another problem will involve acceptance of the WWIMS methodology as the basis for a national warning methodology. However, most of these arguments hinge on the limitations of the current system. They can be dispelled by the expansion of indicators and the tailoring of existing and future matrices and Warning Problems.

There will also be reluctance on the part of agencies to participate in this joint venture. However, interagency committees, working groups, and even the IC staff have survived agency rivalries. The National Warning Center can remove some of the warning burden and chaos in the current system and unify interagency efforts. All that is required is the will to do it.

Probably the most important problem in establishing a National Warning Center will be attracting the right analysts.

As already indicated, most analysts know little or nothing about warning as an analytical discipline or its practical application in support of the NCA. In general, intelligence analysts build their reputations on being right and being published. The warning analyst usually has neither of these advantages. As discussed previously, a successful warning analyst prefers to be "wrong," but only wrong because warning was given sufficiently early allowing the NCA to exercise options which alter hostile intentions. In cases such as these, very few individuals would be privy to the analysis and the subsequent actions and reactions. In fact, most significant warning analysis will have limited distribution due to sensitivity.

Ultimately, analysts must be attracted to the National Warning Center by the challenge presented by warning analysis. This, in turn, requires the Intelligence Community and its leadership to recognize the importance of the warning mission and institute the organizational and methodological changes, and training programs necessary to create a viable, responsive National Warning System to support the NCA.

CHAPTER V

CONCLUSIONS

Strategic warning is one of the most difficult and least understood aspects of the intelligence process. Yet as complex as it may be, it is one of the most essential services provided to a nation's leadership by intelligence organizations. Our current National Warning System is neither effectively "National," nor is it a system. These factors limit its ability to provide accurate and timely warning. The proposals in this paper will organize and unify the Intelligence Community warning efforts through a National Warning Center and a standard warning analysis methodology. This is particularly appropriate at a time when the U.S. will be less capable of exercising a military option. The additional time which this new National Warning System should provide decision makers will allow for other options.

It is impossible to totally eliminate the possibility of surprise, but a comprehensive, integrated National Warning System can significantly reduce that possibility. The indicators were there to predict the fall of the Shah of Iran, the Yom Kippur War, and the Argentine invasion of the Falkland Islands. Still, in every case and for various reasons, some of the best intelligence organizations in the world failed to give

adequate warning to their national leadership. The establishment of a National Warning Center and a standard warning methodology would be a major step toward precluding such events in the future. It will require an unusual degree of cooperation between our various national-level intelligence agencies. It will also require pressure and support from National and Intelligence Community leadership for effective implementation. But it would be a worthy cause and in the best interests of the Intelligence Community and the United States.

LIST OF REFERENCES

1. National Security Strategy of the United States. Washington: The White House, January 1988.
2. Kam, Ephraim. Surprise Attack. Cambridge, MA: Harvard University Press, 1988.
3. Jervis, Robert. Perception and Misperception in International Politics. Princeton: Princeton University Press, 1976.
4. Swenson, Russell and Woodward, Ronald. "Principles and Practices of Warning." Washington DC, 1988.
5. Joint Chiefs of Staff. Dictionary of Military and Associated Terms. Washington DC, 1 June 1987.
6. "Soviet Changes Mean Earlier Word of Attack." New York Times, 26 November 1989, sec. 1, p. 18.
7. "Study Finds NATO War Plans Outdated." Washington Post, 29 November 1989, sec. A, p. 1.
8. Herzog, Chiam. The War of Atonement. Tel Aviv: Steimatzky, 1975.
9. "U.S. Congress Select Committee on Intelligence." The Pike Papers (CIA Report). 29 January 1976.
10. Rees, David. Korea: The Limited War. Baltimore: Penguin, 1970.
11. Wohlstetter, Roberta. Pearl Harbor: Warning and Decision. Stanford: Stanford University Press, 1962.
12. _____. "Cuba and Pearl Harbor: Hindsight and Foresight." Foreign Affairs 43 (July 1965):691-707.
13. Jervis, Robert. "Minimizing Misperception." Thought and Action in Foreign Policy. Edited by Matthew Bonham and Michael Shapiro. Basel: Birkhauser Verlag, 1977.
14. Defense Intelligence Agency. Worldwide Warning Indicator Monitoring System (WWIMS) Operations Manual DJS-2620-11-89. Washington DC, 1989.